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| 10/602,839 | 06/24/2003 | Thomas M. Laney | 84945FCPK | 8798 |
| 7590 | 12/23/2004 | | | EXAMINER Koch, George R |
| Paul A. Leipold Patent Legal Staff Eastman Kodak Company 343 State Street Rochester, NY 14650-2201 | | | ART UNIT 1734 | PAPER NUMBER |

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Please find below and/or attached an Office communication concerning this application or proceeding.

| | | | |
|------------------------------|------------------------|---------------------|--|
| Office Action Summary | Application No. | Applicant(s) | |
| | 10/602,839 | LANEY ET AL. | |
| | Examiner | Art Unit | |
| | George R. Koch III | 1734 | |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 07 October 2004.
- 2a) This action is **FINAL**. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-45 is/are pending in the application.
- 4a) Of the above claim(s) 45 is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-44 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date <u>6/24/2003</u> . | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Election/Restrictions

1. Applicant's election without traverse of group I, claims 1-44 in the reply filed on 10/07/2004 is acknowledged.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 1-9, 11-13, 25, 33-36, 39, 40 and 44 are rejected under 35 U.S.C. 102(b) as being anticipated by Freedman (US Patent 5,372,669).

It is noted that the applicant recites various "optional" steps and layers/components. All of these steps and layers/components are considered as not being required and thus as having no patentable weight.

Freedman discloses a process for making a pre-label receiver sheet comprising a pragmatic pre-label sheet (for example, Figure 1, layers 12, 14, and 16) and a carrier sheet (layer 10), which pragmatic pre-label sheet comprises, in order, a polymeric image-receiving layer (layer 14), a pragmatic polymer sheet (layers 12 and 16), and an adhesive layer, which process comprises the following steps:

(a) providing a pragmatic pre-label sheet by the following steps:

(i) co-extruding (see figure 3a) a first melt for a polymeric image-receiving layer with one or more other melts for forming a single-layer or multiple-layer

pragmatic polymer sheet, wherein said one or more other melts includes a second melt comprising an orientable thermoplastic polymeric material (layer 12) for forming a microvoided layer (voids - item 29) comprising a void initiator (items 22, 22a, and 22b), thereby forming a co-extruded cast composite film comprising at least said image-receiving layer and said microvoided layer;

(ii) stretching (column 3, line 49 to column 4, line 24) in at least one direction said cast composite film to reduce the thickness of the layers in the composite film and to produce an oriented composite film, wherein the image receiving layer is less than 15 micrometers thick (see column 4, lines 11-15, which discloses that the entire composite film can be as thin as .5 mils, i.e., 12.7 micrometers, of which the image receiving layer is a subcomponent and thus is smaller than 12.7 micrometers); and

(iv) applying a pressure-sensitive adhesive layer (see columns 4-5), or a laminate comprising a pressure-sensitive adhesive layer, to at least a portion of the back surface side of the stretched composite film, on the side opposite the image-receiving layer, to form a pre-label receiver sheet or, when an intermediate sheet is present, to at least a portion of the back surface of the intermediate sheet;

(b) providing the pre-label receiver sheet with a carrier sheet (item 10) such that the adhesive layer of the pre-label receiver sheet is releasably covered with the carrier sheet in peelable adhesion, thereby forming an integral-separable pre-label receiver sheet.

As to claim 2, Freedman discloses that the carrier sheet is laminated to the pragmatic pre-label sheet so that a front surface of the carrier sheet faces the back surface of the pragmatic pre-label sheet (see Figures 3a and 3c).

As to claim 3, Freedman discloses that at least one pragmatic-label portion is formed in the pragmatic pre-label sheet by cutting a shape through the pragmatic pre-label sheet but not through the carrier sheet (see Figure 3c).

As to claim 4, Freedman discloses that the microvoided layer can comprise a polyester material in the form of the filler material that forms the voids (see column 3, line 21) or the layer material (see column 10, line 45).

As to claim 5, Freedman further discloses that both the microvoided layer and the image receiving layer can comprise a polyester material (items 22a and 22b) in the form of the filler material that forms the voids (see column 3, line 21, and see Figure 1) or the layer material (see column 10, line 45).

As to claim 6, Freedman discloses that the pragmatic polymer sheet further comprises a coextruded second layer (for example, item 16) in addition to the microvoided layer (item 12), said microvoided layer having a top side and a bottom side, wherein the coextruded second layer is on the bottom side of the microvoided layer and the image receiving layer (item 14) is on the top side of the microvoided layer.

As to claim 7, Freedman can be interpreted as disclosing that the pragmatic pre-label sheet consists essentially of only coextruded biaxially Stretched layers above the pressure-sensitive adhesive layer.

As to claim 8, the pragmatic pre-label sheet can be interpreted as consisting essentially of the image receiving layer (item 14) and the pragmatic polymer sheet (items 12 and 16).

As to claim 9, Freedman discloses that the pressure sensitive adhesive layer can be coated onto a peelable carrier to form a pressure sensitive adhesive transfer sheet, wherein the sheet is laminated to the back side of the stretched composite film such that steps (a)(iv) and (b) occur simultaneously (see column 6, lines 20-29).

As claim 11, Freedman discloses a process for making a pre-label receiver sheet comprising a pragmatic pre-label sheet (for example, Figure 1, layers 12, 14, and 16) and a carrier sheet (layer 10), which pragmatic pre-label sheet comprises, in order, a polymeric image-receiving layer (layer 14), a pragmatic polymer sheet (layers 12 and 16), and an adhesive layer, which process comprises the following steps:

- (a) providing a pragmatic pre-label sheet by the following steps:
 - (i) co-extruding (see figure 3a) a first melt for a polymeric image-receiving layer with one or more other melts for forming a single-layer or multiple-layer pragmatic polymer sheet, wherein said one or more other melts includes a second melt comprising an orientable thermoplastic polymeric material (layer 12) for forming a microvoided layer (voids - item 29) comprising a void initiator (items 22, 22a, and 22b), thereby forming a co-extruded cast composite film comprising at least said image-receiving layer and said microvoided layer;
 - (ii) stretching (column 3, line 49 to column 4, line 24) in at least one direction said cast composite film to reduce the thickness of the layers in the

composite film and to produce an oriented composite film, wherein the image receiving layer is less than 15 micrometers thick (see column 4, lines 11-15, which discloses that the entire composite film can be as thin as .5 mils, i.e., 12.7 micrometers, of which the image receiving layer is a subcomponent and thus is smaller than 12.7 micrometers); and

(iv) applying a pressure-sensitive adhesive layer (see columns 4-5), or a laminate comprising a pressure-sensitive adhesive layer, to at least a portion of the back surface side of the stretched composite film, on the side opposite the image-receiving layer, to form a pre-label receiver sheet or, when an intermediate sheet is present, to at least a portion of the back surface of the intermediate sheet;

(b) providing the pre-label receiver sheet with a carrier sheet (item 10) such that the adhesive layer of the pre-label receiver sheet is releasably covered with the carrier sheet in peelable adhesion, thereby forming an integral-separable pre-label receiver sheet.

(c) imagewise thermally transferring dyes to form at least one image in the image-receiving layer (see column 4, lines 48-55);

(d) cutting at least one shape into at least the pre-label receiver sheet to form at least one pragmatic label comprising a thermal-dye-transfer image, thereby forming an integral-separable label sheet comprising a pragmatic-label sheet attached to a carrier sheet (see Figures 3a and 3c).

As to claim 12, Freedman discloses that the cutting lines can be formed at least partially through the integral separable pre-label receiver sheet, so to allow peeling of at least one pragmatic label portion comprising a portioned image receiving layer, substrate and bottom pressure sensitive adhesive layer, wherein the substrate consists of all of the layers, including the portioned pragmatic polymer between the image receiving layer and the bottom pressure sensitive layer.

As to claim 13, Freedman discloses that the integral separable label sheet comprises a plurality of pragmatic label portions and cutting lines are formed around and through each pragmatic label portion but substantially not in or through the carrier sheet (see, for example, Figure 3c and column 6).

As to claim 15, Freedman discloses imagewise thermally transferring dyes to form at least one image in the image-receiving layer (see column 4, lines 48-55).

As to claim 19, Freedman discloses that the microvoided layer can comprise a continuous phase polyester matrix (column 10, line 45) having dispersed therein void initiators selected from the group consisting of crosslinked organic microbeads, inorganic particles, non-crosslinked polymer particles that are immiscible with the polyester matrix and combinations thereof (see column 3, lines 9-50), said microvoided layer having a void volume of at least 25% by volume (see column 3, lines 22-25, which discloses a filler, i.e., void, volume of 5% to 40% by weight).

As to claim 25, dependent on claim 2, Freedman discloses that the coextruded third layer can be a non-void polyester (column 10, line 45).

As to claim 33 and 34, the microvoided layer Freedman, being made of substantially similar materials as claimed and with substantially similar voids, would inherently include the claimed density.

As to claim 35, Freedman discloses that the total thickness of the laminate can be between 0.5 mils to 10 mils (12.7 micrometers to 254 micrometers). Furthermore, Freedman discloses that the thickness of the non-voided layers (items 14 and 16) can be between one tenth of a mil to several tenths of a mil (i.e., 2.54 micrometers to 17.8 micrometers). Thus, Freedman discloses that the void layer can be between 20 to 150 micrometers.

As to claim 36, Freedman discloses that the image receiving layer (item 14) can comprise polyester (column 10, line 45) or polycarbonate (column 8).

As to claim 39, Freedman discloses a process for making a integral-separable pre-label receiver sheet, comprising a pragmatic pre-label sheet and a carrier sheet, which pragmatic pre-label sheet comprises, in order, a polymeric image-receiving layer, a pragmatic polymer sheet, and an adhesive layer, which process comprises the following steps:

(a) providing a pragmatic pre-label sheet by the following steps:

(i) co-extruding a first melt for a polymeric image-receiving layer with at least two other melts for forming a multiple-layer pragmatic polymer sheet, wherein said at least two other melts includes a second melt comprising a continuous phase polymer matrix (column 3, lines 1-8) having dispersed therein cross-linked organic microbeads (for example, items 22, 22a, and 22b - and see

column 3 which discloses that these filler items can be organic materials), and a third melt comprising a voided or non-voided thermoplastic material (column 3, lines 1-8), thereby forming a coextruded cast composite film comprising at least said three layers (items 12, 14, and 16), the image-receiving layer (item 14), the microvoided layer (item 12, voids, item 29) and the voided or non-voided thermoplastic material (item 16);

(ii) stretching (see column 3, line 51 to column 4, line 10) in at least one direction said cast composite film to reduce the thickness of the layers in the composite film and to produce an oriented composite film comprising as the first layer an image-receiving layer, as the second layer a microvoided compliant layer, and as a third layer a microvoided or non-voided underlayer, wherein the image receiving layer is less than 15 micrometers thick (see column 4, lines 11-15, which discloses that the entire composite film can be as thin as .5 mils, i.e., 12.7 micrometers, of which the image receiving layer is a subcomponent and thus is smaller than 12.7 micrometers); and

(iv) applying a pressure-sensitive adhesive layer (see columns 4-5), or a laminate comprising a pressure-sensitive adhesive layer, to at least a portion of back surface side of the sketched composite film, on the side opposite the image-receiving layer, to form a pragmatic-label sheet or, when an intermediate sheet is present, to at least a portion of the back surface of the intermediate sheet; and

(b) providing the pragmatic pre-label sheet with a carrier sheet (item 10) such that the adhesive layer of the pragmatic pre-label sheet is releasably covered with the carrier sheet in peelable adhesion, thereby forming an integral-separable pre-label receiver sheet.

As to claim 40, Freedman discloses that the at least two other melts for forming a multiple-layer pragmatic polymer sheet, wherein said at least two other melts includes a second melt comprising a continuous phase polymer matrix (column 3, lines 1-8) having dispersed therein cross-linked organic microbeads (for example, items 22, 22a, and 22b - and see column 3 which discloses that these filler items can be organic materials), and a third melt comprising a voided or non-voided thermoplastic material (column 3, lines 1-8), thereby forming a coextruded cast composite film comprising at least said three layers (items 12, 14, and 16), the image-receiving layer (item 14), the microvoided layer (item 12) and the voided or non-voided thermoplastic material (item 16).

As to claim 44, Freedman discloses the step of removing the carrier and applying the pragmatic label portion (item 34, figure 3d) to a package or container (item 36).

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148

USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

6. Claims 19-26, 38, and 41-43 are rejected under 35 U.S.C. 103(a) as being unpatentable over Freedman as applied to claims 1-3 and 11 above.

Freedman discloses all of the limitations of claims 1.

Furthermore, as to claims 19-21, Freedman discloses the claimed materials, such as various organic materials, inorganic materials, and polymer particles, being used in a polyester matrix and having a void volume of 25% (5 to 40% by weight - in the case of polyester particles in a polyester matrix, 5 to 40% by weight would be 5 to 40% by volume, since the particles would have approximately the same weight as the matrix). However, Freedman does not explicitly disclose all of the combinations, such as the combinations of the claimed materials, or whether the materials are microbeads. However, one in the art would immediately appreciate that any combination and variation of the materials would allow for finer modification of the void properties, such as density and hardness. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized such combinations and forms in order to achieve finer control over the void properties.

As to claim 22, Freedman discloses a coextruded third layer as claimed (item 16).

As to claim 23, Freedman discloses that the coextruded third layer can be polyester (column 10, line 45).

As to claim 24, Freedman as applied to claims 19-21 above discloses that the microvoided layer can be a continuous phase polyester matrix and makes obvious that the microvoided layer can have dispersed therein only crosslinked polymer microbeads.

As to claim 25, dependent on claim 20, Freedman discloses that the coextruded third layer can be a non-void polyester (column 10, line 45).

As to claim 26, Freedman discloses that the void volume is 5 to 40% by weight. Furthermore, official notice is taken that extending the void volume to 65% by volume would be well known and conventional. One in the art would immediately appreciate that any combination and variation of the materials would allow for finer modification of the void properties, such as density and hardness. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized such combinations and forms in order to achieve finer control over the void properties.

As to claim 38, while Freedman discloses the claimed materials, Freedman does not suggest the combination in the polymester matrix at the claimed ratios. However, official notice is taken that selecting the combination of crosslinked organic microbeads to non-crosslinked polymer particles as void initiators in the claimed range of 4:1 to 1:4 is well known and conventional. One in the art would immediately appreciate that any combination and variation of the materials would allow for finer modification of the void

properties, such as density and hardness. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized such combinations and forms in order to achieve finer control over the void properties.

As to claim 41, official notice is taken that the use of fiducial marks is notoriously well known and conventional. Such marks are routinely used to enable registration of the labels and to enable registration of the images in order to ensure quality. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized fiducial marks in order to ensure quality in registering the print images.

As to claim 42, Freedman does not suggest utilizing exposed edges. However, official notice is taken that it would have been well known and conventional to utilize exposed edges having a width less than 20 millimeters. One in the art would appreciate that exposed edges would have improved the capability to peel the label off the carrier. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized exposed edges in order to improve the ability to peel the label off the carrier.

As to claim 43, Freedman discloses using peelable carriers, but does not suggest utilizing a peelable carrier with the claimed stiffness. However, official notice is taken that it would have been well known and conventional to a stiffness of 15 to 60 millinewtons. One in the art would appreciate that the claimed stiffness would have improved the capability to peel the label off the carrier. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized the claimed stiffness in order to improve the ability to peel the label off the carrier.

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7. Claims 10, 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Freedman as applied to claim 1 above, and further in view of either of Knauf (US 6,210,767) and Shirai (US 6,153,558).

Freedman discloses all of the limitations of claim 1 above. However, while Freedman discloses using carrier sheets, Freedman does not suggest that the carrier sheet comprises more than one layer and that the layers of the carrier sheet are applied to the pre-label receiver sheet in more than one step.

However, Knauf discloses that multilayer carriers are used (see Figures and columns 1-3) and further discloses that such carriers resists curling and prevent contamination (column 3, lines 37-40), and that the carrier can be applied in multiple steps, such as those involving additional coatings (see column 4, lines 37-44). Shirai also discloses multilayer carrier sheets (item 3, comprised of layers 8, 9, 10 and 11), and these sheets are used with thermal dye transfer labels. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized such multilayer carriers in order to resist curling and prevent fiber contamination.

As to claim 14, Freedman discloses multiple pragmatic label portions in the sheet are formed (see Figure 3c) by sectioning the sheet into a plurality of frames each forming a separable label.

8. Claims 11, 12, 15-18, 27-37, 40, 42, and 44 are rejected under 35 U.S.C. 103(a) as being unpatentable over Freedman as applied to claim 1 and 11 above, and further in view of Shirai (US Patent 6,153,558), Harrison (US 5,399,218), and/or Oshima (US 6,162,517).

As to claim 7, Freedman is interpreted as disclosing biaxial stretching. In any event, Harrison explicitly disclose that biaxial stretching may be used. Harrison discloses that biaxial stretching (column 6, lines 23-38) and one in the art would appreciate that such stretching ensures that the film achieves the proper thickness and thickness consistency. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized such biaxial stretching in order to achieve proper thickness and thickness consistency.

As to claim 11 and 15, Freedman as applied above in claims 1 and 11 suggests applying thermal dyes, which are interpreted as images. It can be argued that this transferring is not part of an image. However, Shirai discloses transferring thermal dyes (column 5, line 37 to column 6, line 11), and discloses that doing so ensures that images are placed on the composite. Oshima discloses that sublimation transfer printing can improve image quality (see columns 6-16). Harrison discloses that sublimable dyes result in good print results (column 7, lines 31-42). One in the art would immediately recognize that such improved images would increase the desirability of the labeled articles. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized such transfer printing in order to achieve quality images.

As to claim 12, Freedman discloses that the cutting lines can be formed at least partially through the integral separable pre-label receiver sheet, so to allow peeling of at least one pragmatic label portion comprising a portioned image receiving layer, substrate and bottom pressure sensitive adhesive layer, wherein the substrate consists

of all of the layers, including the portioned pragmatic polymer between the image receiving layer and the bottom pressure sensitive layer.

As to claim 16, Oshima as incorporated above discloses that the dye image is a sublimations transferred image.

As to claim 17 and 18, the sublimation process of Oshima discloses achieving the claimed density (see Table 2, columns 17-18).

As to claim 27, Freedman does disclose that the microvoided layer can be polyester thermoplastics, but does not go into further detail to suggest that the polyester is polyethylene terephthalate or a copolymer thereof.

Harrison discloses that the polyester for a core layer containing voids can be polyethylene terephthalate and copolymers thereof (see column 5, lines 5-26).

Furthermore, Harrison discloses polyethylene terephthalate is especially preferred (see column 5, lines 52-53), and one in the art would appreciate that this material provides desirable material qualities. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized polyethylene terephthalate in order to achieve desirable material qualities.

As to claims 28-32, official notice is taken that the claimed materials are well known and conventional in view of the materials disclosed in Freedman, Harrison, Shirai and Oshima. One in the art would immediately appreciate that these material provide various desirable material qualities. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have these materials in order to achieve desirable material qualities.

As to claim 33 and 34, the microvoided layer Freedman, being made of substantially similar materials as claimed and with substantially similar voids, would inherently include the claimed density. Alternatively, official notice is taken that it would have been well known and conventional to have experimentally achieved the claimed microvoid densities. One in the art would appreciate that the claimed density could be achieved by routine experimentation, and in light with desired end product quality. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized the claimed densities in order to achieve a desirable end product.

As to claim 35, Freedman discloses that the total thickness of the laminate can be between 0.5 mils to 10 mils (12.7 micrometers to 254 micrometers). Furthermore, Freedman discloses that the thickness of the non-voided layers (items 14 and 16) can be between one tenth of a mil to several tenths of a mil (i.e., 2.54 micrometers to 17.8 micrometers). Thus, Freedman discloses that the void layer can be between 20 to 150 micrometers.

As to claim 36, Freedman discloses that the image receiving layer (item 14) can comprise polyester (column 10, line 45) or polycarbonate (column 8).

As to claim 37, Freedman discloses a number of polymer materials, including polyester and polycarbonate, but does not suggest combining polyester and polycarbonate in the claimed ranges. However, official notice is taken that it would have been well known and conventional to have experimentally achieved the claimed mixture of the two disclosed materials. One in the art would appreciate that the claimed

material could be achieved by routine experimentation, and in light with desired end product quality. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized the claimed weight ratio in order to achieve a desirable end product.

As to claim 40, Freedman discloses that the at least two other melts for forming a multiple-layer pragmatic polymer sheet, wherein said at least two other melts includes a second melt comprising a continuous phase polymer matrix (column 3, lines 1-8) having dispersed therein cross-linked organic microbeads (for example, items 22, 22a, and 22b - and see column 3 which discloses that these filler items can be organic materials), and a third melt comprising a voided or non-voided thermoplastic material (column 3, lines 1-8), thereby forming a coextruded cast composite film comprising at least said three layers (items 12, 14, and 16), the image-receiving layer (item 14), the microvoided layer (item 12) and the voided or non-voided thermoplastic material (item 16).

As to claim 42, Freedman does not suggest utilizing exposed edge. However, official notice is taken that it would have been well known and conventional to utilize exposed edges having a width less than 20 millimeters. One in the art would appreciate that exposed edges would have improved the capability to peel the label off the carrier. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to have utilized exposed edges in order to improve the ability to peel the label off the carrier.

As to claim 44, Freedman discloses the step of removing the carrier and applying the pragmatic label portion (item 34, figure 3d) to a package or container (item 36).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to George R. Koch III whose telephone number is (571) 272-1230 (TDD only). If the applicant cannot make a direct TDD-to-TDD call, the applicant can communicate by calling the Federal Relay Service at 1-866-377-8642 and giving the operator the above TDD number. The examiner can normally be reached on M-Th 10-7.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christopher Fiorilla can be reached on (571) 272-1187. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



George R. Koch III
Patent Examiner
Art Unit 1734

GRK
12/18/2004